

REMARKS

Introduction

In response to the Office Action dated April 1, 2009, the Applicant has amended claims 29, 38, 51, 52, and 54. Support for amended claims 29, 38, and 52 is found in, for example, Figs. 1 and 2; pg. 26, lines 12-17. Dependent claims 51 and 54 have been rewritten into independent form including all of the limitations of the base claim and any intervening claims. Care has been taken to avoid the introduction of new matter. In view of the foregoing amendments and the following remarks, the Applicant respectfully submits that all pending claims are in condition for allowance.

Allowable Subject Matter

Claims 51 and 54 are objected to as being dependent upon a rejected based claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and intervening claims.

In accordance with the Examiner's recommendation, dependent claims 51 and 54 have been rewritten into independent form including all of the limitations of their respective base claims.

The Applicant notes the Examiner's Statement of Reasons for Allowance included on page 5 of the Office Action. Entry of that Statement into the record should not be construed as any

agreement with or acquiescence by the Applicant in the reasoning stated by the Examiner. The Statement of Reasons for Allowance should not be used to interpret the cited claims, particularly to the extent if any that the Statement of Reasons for Allowance may differ from the express language of the claims and/or the otherwise proper construction of those claims. It is respectfully submitted that the allowed claims should be entitled the broadest reasonable interpretation and broadest range of equivalents that are appropriate in light of the language of the claims and the supporting disclosure, without reference to the Statement of Reasons for Allowance.

Claim Rejection Under 35 U.S.C. § 102

Claims 20-40, 42-45, 48, 52, and 52 are rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 2,789,312 to Borer.

The Applicant respectfully traverses.

An aspect of amended independent claims 29, 38, and 52 is a common mould opening direction for both of the injection and blow cavities. Another aspect of amended independent claims 29, 38, and 52 is that the blow cavities have their axes perpendicular to the common moulding direction and are disposed with their necks on the periphery of the mould set. An aspect of amended independent claims 29, 38, and 52 includes aligning

the axes of the injection cavities parallel to the mould opening direction.

Borer describes an arrangement where there is a common mould opening direction for both of the injection and blow cavities where the blow cavities have their axes perpendicular to the mould opening direction and the blow cavities and necks are on the periphery. In Borer, the longitudinal axes of the injection moulding cavities are **perpendicular** to the common mould opening direction and are generally parallel to the axes of the blow moulding cavities. Borer shows, in Figs. 5-13 and 15, that the axes of the blow moulding cavity and the injection moulding cavity are parallel so that the carrier 67 can rotate back and forth to transfer the preform from the injection moulding cavity to the blow moulding cavity.

In contrast, the claimed subject matter includes the feature of the neck of the injection moulding cavity facing to the periphery of the mould set so that is it laterally accessible.

Borer fails to disclose or suggest, at a minimum, that the longitudinal axes of the injection-moulding cavities are arranged to extend generally **parallel** to the common mould separation direction, as required by amended claims 29, 28, and 52.

As anticipation under 35 U.S.C. § 102 requires that each and every element of the claim be disclosed, either expressly or inherently (noting that "inherency may not be

established by probabilities or possibilities," *Scaltech Inc. v. Retec/Tetra*, 178 F.3d 1378 (Fed. Cir. 1999)), in a single prior art reference, *Akzo N.V. v. U.S. Int'l Trade Commission*, 808 F.2d 1471 (Fed. Cir. 1986), based on the forgoing, it is submitted that Borer does not anticipate claims 29, 28, and 52 nor any claim dependent thereon.

Further, a person skilled in the art would not be motivated to modify Borer's apparatus to arrange the injection moulding cavities to be perpendicular to the blow moulding cavities and parallel to the common mould separating direction.

Claims 29, 36-40, 42, 43, 45, 48, 52, and 53 are rejected under 35 U.S.C. § 102(b) as being anticipated by U.S. Patent No. 4,579,518 to Farrell.

In Farrell, the longitudinal axes of the injection moulding cavities are arranged **perpendicular** to the common mould separation direction, generally coplanar with the longitudinal axes of the blow moulding cavities. Farrell's apparatus is designed to allow peripheral access to both of the blow moulding cavities and injection moulding cavities such that core rods on a turntable can be indexed in succession from the injection moulding cavity to the blow moulding cavity and to a stripping station. Thus, Farrell fails to disclose or suggest, at a minimum, that the longitudinal axes of the injection-moulding cavities are arranged to extend generally **parallel** to the common

mould separation direction, as required by amended claims 29, 28, and 52.

As anticipation under 35 U.S.C. § 102 requires that each and every element of the claim be disclosed, either expressly or inherently (noting that "inherency may not be established by probabilities or possibilities," *Scaltech Inc. v. Retec/Tetra*, 178 F.3d 1378 (Fed. Cir. 1999)), in a single prior art reference, *Akzo N.V. v. U.S. Int'l Trade Commission*, 808 F.2d 1471 (Fed. Cir. 1986), based on the forgoing, it is submitted that Farrell does not anticipate claims 29, 28, and 52 nor any claim dependent thereon.

Further, a person skilled in the art would not be motivated to modify Farrell's apparatus to arrange the injection moulding cavities to be parallel to the common mould separation direction.

Thereby as taught in the instant specification, the required clamping force of the clamping unit is reduced because the projected area of the injection-moulded preforms on the clamping plate/platen is more compact due to the position of the neck regions of the blow-moulding cavities (see, e.g., Fig. 1; pg. 27, lines 3-14 of the originally filed specification). However, Farrell does not disclose or suggest this, and apparently is unaware of the improvement in the lighter construction and reduced costs provided by the claimed injection moulding apparatus.

Withdrawal of the foregoing rejections is respectfully requested.

Claim Rejection Under 35 U.S.C. § 103

Claims 41, 46, 47, 49, and 50 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Farrell in view of U.S. Patent No. 4,140,468 to Duga.

The Office Action admits that Farrell does not disclose the use of a stretching rod in conjunction with the blow mould and a neck mould that transfers the parison from the injection mould to the blow mould. The Office Action relies on Duga in an attempt to cure the admitted deficiencies of Farrell. The Office Action asserts that Duga discloses an array of injection moulds having a plurality of neck cavity moulds 38 that serve to transfer the preforms from the injection moulds 33 to the blow moulds 51 where the blow moulds have a blow stretch rod 59 introduced into the blow mould to stretch the preform within the blow moulding cavity. The Examiner contends that it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the apparatus of Farrell by using a neck mould common to the blow mould and the injection mould to transfer preforms from the injection mould to the blow mould as disclosed by Duga because the simple transfer of preforms and the use of a dedicated injection core rod and a dedicated stretch rod in the respective injection and blow moulds such that the preforms can be stretched within the blow mould such that the

parison is oriented mechanically during the blow moulding process.

Although not relied to do so, Duga fails to disclose or suggest, at a minimum, that the longitudinal axes of the injection-moulding cavities are arranged to extend generally parallel to the common mould separation direction, as required by amended claim 38. Thus, Duga fails to cure the deficiencies of Farrell.

According to the present application, the parting line of the injection mould is a circle around the neck of preform, which is not normally visible or blown during the blowing step. In Farrell, the parting line is along the length of the preform, which is blown. Therefore, the parting line will be visible on the bottle.

According to the claimed subject matter per amended claim 38, the axes of the injection cavities are parallel to the common mould opening direction and perpendicular to the axes of the blow cavities to provide the following advantages. This orientation of the injection mould cavities allows for a higher density of cavities into a particular mould set in combination with the blow-mould cavities. The preforms of the present application are not normally transported using the cores. The preforms are removed from the cores with a neck gripper or some other transport means gripping the necks of the preforms and transporting them to the blow cavities.

Farrell, however, like most conventional injection/blow methods, transports the preforms from the injection to the blow cavities while the preforms are still on the cores, for example, male parts of the injection mould. In this manner, the cores are used to transport the preforms usually with a rotary movement. Consequently, to make rotary movement possible in Farrell, it is most desirable for the injection and blow moulding cavity axes to be in the *same plane*. This plane is perpendicular to the common mould opening direction.

As Farrell and Duga do not disclose the same injection moulding apparatus as disclosed by the present inventors, and even if combined still fail to disclose or suggest the elements recited by amended claim 38, the combination of Farrell and Duga does not render the apparatus as recited by amended claim 38 obvious.

Claims 41, 46, 47, 49, and 50 depend from claim 38 and include all of the features of that claim plus additional features, which are not taught or suggested by the cited references. Therefore, for at least these reasons, it is respectfully submitted that claims 41, 46, 47, 49, and 50 also patentably distinguish over the cited references.

Withdrawal of the foregoing rejection is respectfully requested.

Conclusion

The Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or credit any overpayment to Deposit Account No. 25-0120 for any additional fees required under 37 C.F.R. § 1.16 or under 37 C.F.R. § 1.17.

Respectfully submitted,

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